CHAPTER XII

SPRINKLER STANDARDS

This Section includes standards for use of sprinkler systems in multi-family and commercial buildings.

ARTICLE I. SCOPE AND EXCLUSIONS

- 1. All commercial buildings and multi-family residential structures within the City of Woodstock, Georgia shall be construed with an approved sprinkler system throughout, as defined by NFPA \$13.
- 2. This Ordinance shall apply to multi-family residential structures and commercial structures over 3,500 square feet and structure that are not covered by other codes.
- 3. This Ordinance shall not apply to a duplex or free standing single family residence.
- 4. An NFPA # 13 R system will only be permitted in structures up to 3,500 square feet. Anything above three (3) stories or 3,500 square feet in size must have an NFPA 13 System.

ARTICLE II. DEISNG GUIDELINES FOR COMMERCIAL BUILDINGS

THREE STORIES OR LESS, THAT ARE NOT REQUIRED TO BE SPRINKLED BY OTHER CODES

- 1. A combination fire protection sprinkler system may be allowed in commercial buildings that are three (3) stories in height or less and which are not required to have sprinkler systems by other codes. A combination sprinkler system shall comply with the following:
 - a. No anti-freeze solution or any other additive shall be allowed in any combination sprinkler system.
 - b. When dead end systems are used, the sprinkler system shall be isolated form the domestic water supply by not less than a dual check valve assembly. That conforms to underwriters laboratories standards and is approved by the City of Woodstock. A union and full port shut off, acceptable to the City of Woodstock fire service, shall be installed on both sides of the check valve assembly to facilitate removal for test and repair.

If the sprinkler system exceeds 175 psi a pressure reducing valve must be used.

- c. When the dual check valve and shut-off valves are installed outside the structure, they shall not be buried in the earth, but shall be protected form freezing, at a location acceptable to the City of Woodstock fire service. For example, in a pre-cast concrete valve pit with cover. The top of the protective housing shall extend one-half (1/2) inch above the finished landscaping and be installed in an area approved by the City of Woodstock fire service.
- d. A water meter shall not be required for the fire protection water line. The City of Woodstock City Council shall establish a monthly sprinkler fee to be added to the water bill. All shut-offs in the sprinkler system shall be secured in an acceptable method to prevent tampering and shall be locked in the open position. A sign shall be placed on the valves which shall read, "Fire department shall be notified when valves are turned off and turned back on". All shut-offs shall be readily accessible to the fire service at all times. Locking devices will be inspected on a routine basis by the Woodstock fire service. If locking devices are broken or not in place, it shall be the responsibility of the owner/tenant to notify the fire service within 24 hours. If notification is not made within the 24 hour limit, the business would be fined up to the amount of five hundred dollars (\$500.00) per occurrence. If a third violation is noted upon inspection, business shall be required to install a water meter at their own expense.
- e. All sprinkler heads shall be UL-Listed. Spacing of all sprinkler heads shall be in accordance with U.L. Listings and manufacturers recommendations.
- f. Sprinkler heads are not required in bathrooms, closets and hallways that are not to be used as means of exit or in attics. All other areas require sprinkler heads including drive-in garages and basements (finished or unfinished). Exception: Sprinkler heads must meet hazardous area hourly fire rating for drive in garages.
- g. All mechanical rooms shall have 135 to 165 Degree commercial sprinkler heads with a maximum 3/8 inch orifice.
- h. Dropped escutcheons shall be used if a sprinkler head is obstructed by light fixtures, beams, pipes, or other features. Additional sprinkler heads may be used for areas where obstructions block spray pattern.
- i. When ceiling fans are used, sprinkler heads shall be located so fan housing does not interfere with the pattern. Installation of sprinkler heads shall still conform to spacing requirements. If sprinkler head location exceeds spacing requirements, additional heads shall be used.

- j. All spacing of sprinkler heads in relation to head products equipment and heaters shall be sprinkled top manufacturers requirements.
- k. All sprinkler piping in unheated areas shall be protected from freezing.
- l. An accepted water flow switch with a bell that can be heard from no less than 500 feet away is required. Both shall be accessible for checking and repair.
- m. Each system shall have an accessible inspectors test drain valve at the most remote point away from the system water supply.
- n. If a sprinkler system issued for more than one (1) living unit and separate electric service is used for each unit, the alarm switch with bell shall be on house electric service.
- o. All condominiums shall have the following wording in the recorded declaration of covenants and a copy of the document shall be provided to the City of Woodstock fire service and the City of Woodstock Building Inspector.

"Sprinkler system: In the event that any unit be equipped with fire sprinkler system heads, compromising any part of the system nor shall any sprinkler head by painted, covered, or otherwise tampered with, or altered".

"Prior to any alterations, amendments, modifications, or change, business will submit such alterations, amendments, modifications or change to the City of Woodstock fire service for their approval and agree to comply with all domestic sprinkler requirements of the City of Woodstock, Georgia".

- p. The installer of any sprinkler system shall be a licensed Georgia fire protection sprinkler installer.
- q. The fire service sprinkler connection shall be located on the front (street side) of the building. The sprinkler connection shall be equipped with a 1½ inch national standard thread (NST) female swivel. The connection shall be unobstructed and clearly marked to be seen from the road.

ARTICLE III. INSPECTION OF SPRINKLER SYSTEMS

1. The fire service shall have access to all sprinkler systems for the purpose of inspections. Inspections may be made annually r as often as deemed necessary by the fire service. Inspections shall include but not be limited, to the following:

- a. Procedures for inspection the sprinkler system shall be set forth by the Fire Chief or Fire Inspector. A copy of which may be obtained from the Woodstock Fire Service.
- b. A sprinkler inspection form shall be filled out in duplicate- one (1) copy shall be given to the owner or occupant and one (1) dopy shall be kept for permanent files of the fire service.
- c. Each riser manifold shall be tagged. The tag shall show date of in inspection and inspector's signature.

ARTICLE IV. EXCEPTIONS TO THE BUILDING CODE

- 1. In buildings up to 5,500 square feet per floor, no fire wall is required.
- 2. In single story buildings divided into occupant units, one (1) hour fire walls extending up thirty-six (36) inches above the roof an out flush with the roof overhang are required when an approved sprinkler system is in place. If no sprinkler system is in place four (4) hour walls are required between units.
- 3. Standard ½ inch gypsum wall board may be substituted for 5/8 inch type "X" gypsum board relating to one (1) hour tenant separation walls.
- 4. Standard ½ inch gypsum wallboard may be substituted for 5/8 inch type "X" gypsum wallboard. One-half (1/2) inch plywood may be substituted for ¾ inch plywood relating to one (1) hour floor-ceiling assemblies.
- 5. Fee simple townhouses may have one (1) hour rated party walls in lieu of two (2) hour rated party walls.
- 6. Attic smoke stops at 3,000 square feet will be allowed in lieu of smoke stops between every unit.
- 7. Exit travel may be extended thirty-five (35) feet in lieu of the existing twenty (20) feet.
- 8. Tenants egress may pass by other tenants doors and windows without those doors and windows being rated.
- 9. Interior finishes shall be class "C" or better instead of class "A" finish.
- 10. One (1) hour rating of walls and door of hazardous areas as noted by the City Fire Service will be required.
- 11. Unless otherwise specified within this code, all other requirements of applicable codes of the City of Woodstock, Georgia shall be complied with.

- 12. Certification of flow must be acceptable to the City of Woodstock fire service.
- 13. In the interest of life safety, other exceptions may be allowed when warranted by the City of Woodstock fire service.
- 14. All new construction must submit sprinkler plans to the City of Woodstock fire service for approval before construction of sprinkler systems commences.